### Monitoring Data Record

Project Title: U-3110A (Cook Road Connector) COE Action ID: 199/00602
Stroom Names Michael's Dronch DWO Nymhan 021105
Stream Name: <u>Michael's Branch</u> DWQ Number: <u>021105</u> City, County and other Location Information: <u>University Drive off of I-40 in Alamance County</u>
City, County and other Location information. Onlycistly Drive on or 1-40 in Alamance County
Date Construction Completed: <u>December 2003</u> Monitoring Quarter: (2) of 8
Ecoregion: 8 digit HUC unit 03030002
USGS Quad Name and Coordinates:
Rosgen Classification:  Length of Project: Urban or Rural: <u>Urban</u> Watershed Size:
Monitoring DATA collected by: M. Green Date: 4/5/06
Applicant Information:
Name: NCDOT Roadside Environmental Unit
Address: 1425 Rock Quarry Rd. Raleigh, NC 27610
Telephone Number: (919) 861-3772 Email address: mlgreen@dot.state.nc.us
Consultant Information:
Name:
Address:
Telephone Number: Email address:
Project Status: Complete
Manitaring Layel required by COE and DWO (404 name) 4/401 Cost.): Layel 1 2 2
Monitoring Level required by COE and DWQ (404 permit/ 401 Cert.): Level (1) 2 3  Monitoring Level 1 requires completion of Section 1, Section 2 and Section 3
Wolltoring Level 1 requires completion of section 1, section 2 and section 3
Permit Conditions: The permittee shall visually monitor the vegetative plantings on all mitigation streambanks to access and insure complete stabilization of the mitigation stream segments. This monitoring shall include adequate visual monitoring of planted vegetation quarterly for a minimum of two years after final planting, and appropriate remedial actions (e.g., replanting, streambank grading, ect.). If within any monitoring year, bank stabilization is not acceptable as determined by the Corps of Engineers, and remedial action required by the Corps of Engineers is performed, the one year monitoring of the affected portions of the stream will begin again.
Section 1. PHOTO REFERENCE SITES (Monitoring at all levels must complete this section)
Total number of reference photo locations at this site: <u>A total of 13 photos were taken from 7</u> photo point locations.
Dates reference photos have been taken at this site: 9/28/05, 12/20/05, 4/5/06
Individual from whom additional photos can be obtained (name, address, phone):
Other Information relative to site photo reference:
If required to complete Level 3 monitoring only stop here; otherwise, complete section 2.

# Section 2. PLANT SURVIVAL Attach plan sheet indicating reference photos. Identify specific problem areas (missing, stressed, damaged or dead plantings): Estimated causes, and proposed/required remedial action: ADDITIONAL COMMENTS: The site was live staked and the buffer area was reforested in February 2005. Vegetation noted on site includes: black willow, silky dogwood, tag alder, Juncus sp., multi-flora rose, and various grasses. The buffer plantings are still dormant at this time.

If required to complete Level 1 and Level 2 monitoring only stop here; otherwise, complete section 3.

### Section 3. CHANNEL STABILITY

**Visual Inspection:** The entire stream project as well as each in-stream structure and bank stabilization/revetment structure must be evaluated and problems addressed.

Report on the visual inspection of channel stability. <u>Physical measurements of channel</u>
stability/morphology will not be required. Include a discussion of any deviations from as-built and an
evaluation of the significance of these deviations and whether they are indicative of a stabilizing or
destabilizing situation.
The streamhonk is stabilized throughout the entire length of the channel for the 2rd quarter of monitoring

The streambank is stabilized throughout the entire length of the channel for the 3rd quarter of monitoring.

Date	Station	Station	Station	Station	Station
Inspected	Number	Number	Number	Number	Number
Structure					
Type					
Is water					
piping					
through or					
around					
structure?					
Head cut or					
down cut					
present?					
Bank or scour					
erosion					
present?					
Other					
problems					
noted?					

**NOTE:** Attach separate narrative sheets to each monitoring report describing/discussing the overall monitoring results. Include the identification of specific problem areas/channel failures, estimated cause and proposed/required remedial action. This should include a brief discussion of any parameter that has changed significantly from as-built.

# Michael's Branch



PP #1 (Upstream-East of University Drive)



PP #2 (Downstream-West of University)



PP #3 (Upstream-Cross Section #1)



PP #3 (Downstream-Cross Section #1)



PP #4 (Upstream-Cross Section #2)



PP #4 (Downstream-Cross Section #2)

December 2005

# Michael's Branch



PP # 5 (Upstream-North of Sub-division Bridge)



PP #5 (Downstream-North of Sub-division Bridge)



PP #6 (Upstream-South of Sub-division Bridge)



PP #6 (Downstream-South of Sub-division Bridge)



PP#7 (Overview of Site Looking Downstream Towards the Sub-division Bridge)

### Michael's Branch



PP#7 (Overview of Site Looking Across Site at University Drive)



PP #7 (Overview of Site Looking Upstream Towards University Drive)

April 2006

